A NEW SILK-SPINNING CHALCID.

BY L. O. HOWARD, WASHINGTON.

During the summer of 1879, while working with Professor Comstock upon the natural enemies of the cotton worm, I came across the following passage in his field notes of the previous year :—

"August 27.—I found yesterday a cotton worm about five-eighths of an inch in length, which, though yet alive, was being destroyed by three green larvæ which were upon it. I found the specimens about 10 a. m. Last evening I observed that the cotton worm was nearly eaten. The parasites had very short bodies, which, when they moved, were pointed at one end. I had intended to describe the specimens, but I find that they have spun cocoons about their bodies.

"August 28.—I found crawling over the ground a small cotton worm, infested by five parasites, evidently of the same species as those mentioned in my note of August 27.

"August 29.—The small green parasites which I found yesterday, destroyed the cotton worm, and, excepting two specimens which I put in alcohol, began to spin cocoons during the night."

Upon looking the specimens up, I found that two adults had issued. Owing to a lack of time the insect was not worked up for the Cotton Insect Report, and only recently have I had time to study it.

Instances in which Chalcid larvæ have been observed to spin perfect cocoons are rare. One of the most marked instances upon record is the case of the European *Euplectrus albiventris*, which was first shown to have this habit by Nees at Esenbeck (Hym. Ochn. Aff. Monogr. II. h 136). Westwood also states (Intr. II 163) that, in drawings of Chalcididæ by Fonscolombe, the larva of this same species was represented as feeding *externally* upon a large caterpillar, and that in his description he, too, noted its cocoon spinning habit.

Now it is quite interesting to find that our cotton worm parasite is also a *Euplectrus*, some thirty years having elapsed before M. de Fonscolombe's observations have been verified. As explanatory of the fact that M. de Fonscolombe and Professor Comstock both observed these larvæ feeding *externally* upon their hosts, it may be urged that this external feeding was simply temporary and preparatory to spinning the cocoon, the larvæ having only recently emerged; yet, from M. de Fonscolombe's wording, "sic

cum eruca crescit, eam paulatim consumens,"—implying continued observation, and also from the fact that Prof. Comstock found his larvæ upon *half-grown* cotton worms, the opposite view can be readily held. The species, I think, may appropriately be dedicated to Prof. Comstock.

EUPLECTRUS COMSTOCKII, n. sp.

Male.—Length of body, 1.8 mm.; expanse of wing, 4 mm.; antennal scape, slender; joint 2, small; remaining five joints larger, ovate, subequal. Head smooth; scutum with many shallow, transversely elongate punctuations; scutellum and remainder of thorax smooth; abdomen smooth and shining. Scutum, with a very delicate longitudinal carina, extending back into the scuto-scutellar furrow, and forward to the prothorax. Middle tibial spur delicate, but as long as the first and second tarsal joints together. Color, black; upper surface of abdomen with an ochreous patch of varying size; antennæ and all legs ochreous; eyes dark red; wing veins fuscous.*

Described from 2 ♂ specimens.

OTTAWA FIELD NATURALISTS' CLUB.

TRANSACTIONS NO. 1.

The records of the first year's efforts of this active and enterprising organization fill a goodly octavo pamphlet of sixty-two pages, which is adorned with two excellent plates. From the annual report of the Council, contained therein, we learn that the Club has a membership of over eighty, and that five excursions, for the purpose of collecting objects of natural history, have taken place during the year, with an average attendance of thirty. During the winter months a successful series of soirees were held, seven in number, at each of which interesting papers were read by members, and the specimens collected on the excursions exhibited. Many of the papers are published in the transactions; also a list of plants collected in the Ottawa district by the energetic Vice-president, Mr. Jas. Fletcher.

In the successful maintenance of this Natural History Club, Ottawa has set a noble example, which we trust will be speedily followed by similar organizations in other cities of our Province.

* In the figure of this insect, p. 196 of the report on Cotton Insect, the tarsi should be 4-jointed instead of 5, and the parts of the mesothorax should be entirely revised.